

Clinical aspects of uncomplicated gonorrhoea in the female*

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The purpose of this paper is to present the results of a prospective study of the clinical characteristics of cases of uncomplicated gonorrhoea in the female and to determine the incidence of trichomoniasis, candidiasis, and other conditions among them. All patients were of the Thai race.

Material and methods

459 female patients with uncomplicated gonorrhoea diagnosed at the out-patients department, Bangrak Hospital, Bangkok, were studied in detail to determine the clinical aspects of their infection. They were selected only in the sense that they were chosen for a study on the sensitivity of gonococci to penicillin in relation to the results of treatment, details of which are presented in another paper (Panikabutra and Suvanmalik, 1973). The patients attended during the period November, 1967, to December, 1970. They were all married and the age distribution is shown in Table I.

TABLE I Age distribution

Age group (yrs)	No. of cases
15-19	59
20-24	188
25-29	121
30-34	54
35-39	30
40-44	5
44-49	2
Total	459

A detailed medical history was taken and a physical examination was performed in all cases. A Cusco bivalve speculum was placed in the vagina with the patient in the lithotomy position and specimens of secretions were obtained from the vagina, cervix, and urethra. A bimanual pelvic examination was done and blood was taken for serological tests for syphilis.

A wet slide, consisting of a loopful of vaginal secretion taken from the posterior vaginal fornix with slight scraping of the wall and mixed with a drop of normal saline, was examined immediately with the direct light

microscope for *Trichomonas vaginalis* and *Candida albicans*. Smears of the urethral and cervical secretions were stained with Gram stain and examined in the clinic. Swabs of urethral and cervical discharge were sent to the laboratory in Stuart's transport medium.

Findings

Table II shows the reasons for attendance of the 459 patients. Only 84 (18.3 per cent.) came at the request of male consorts under treatment; the rest came of their own accord, some with and some without symptoms.

TABLE II Reasons for attendance of women with gonorrhoea

Reason	Symptoms	No. of cases	Percentage
Came of own accord:	Absent	104	81.7
	Present	271	
Came at request of male consort being treated in male clinic:	Absent	43	18.3
	Present	41	
Total		459	100

Reasons for attendance and diagnoses are shown in Table III (overleaf) and symptoms and associated infections in Table IV (overleaf). It was found that 147 (32 per cent.) were asymptomatic. Five had haematuria, and signs of acute inflammation were observed at the external urinary meatus.

Table V shows the duration of symptoms before

TABLE V Duration of symptoms before attending V.D. clinic

Duration (days)	No. of cases
1-7	192
8-14	43
15-21	20
22-30	33
30+	24
Total	312

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TABLE III *Reasons for attendance in relation to diagnosis*

Sources	No. of cases	Distribution of conditions			
		Gonorrhoea	Gonorrhoea + T. vaginalis	Gonorrhoea + T. vaginalis + Candida	Gonorrhoea + Candida
Came of own accord	375	241	110	6	18
Came at request of male consort being treated in the male clinic	84	61	19	2	2
Total	459	302	129	8	20

TABLE IV *Presenting symptoms and associated diseases*

Presenting symptoms	No. of cases	Association of gonorrhoea, trichomoniasis, and candidiasis			
		Gonorrhoea	Gonorrhoea + T. vaginalis	Gonorrhoea + T. vaginalis + Candida	Gonorrhoea + Candida
Asymptomatic	147	99	36	3	9
Profuse vaginal discharge	83	61	21	0	1
plus dysuria	51	26	20	1	4
plus pruritus vulvae	51	32	15	1	3
only	49	35	12	0	2
Pruritus vulvae	48	30	16	1	1
Dysuria	22	11	9	2	0
Lower abdominal discomfort	5	5	0	0	0
Haematuria	3	3	0	0	0
Frequent micturition and lower abdominal discomfort	3	3	0	0	0
Total	459	302	129	8	20

the patients attended the clinic.

Table VI shows the characteristics of the cervical and urethral secretions observed.

TABLE VI *Characteristics of cervical and urethral secretions (459 cases)*

Characteristics	No. of cases	Per cent.
Cervical secretion Cloudy mucus	208	45.3
Mucopurulent	251	54.7
Urethral secretion Purulent	162	35.2

Table VII shows the association of gonorrhoea with other conditions. The commonest association was between gonorrhoea and trichomonal vaginitis; the latter was found in 137 patients (29.8 per cent.) *Candida albicans* was found in 28 cases (6.1 per cent.).

TABLE VII *Finding in 459 cases of uncomplicated gonorrhoea*

Condition	No. of cases	Per cent.
Trichomoniasis	137	29.8
Candidiasis	28	6.1
Cervical erosion	52	11.4
Herpes genitalis	4	0.9
Condylomata acuminata	9	1.9
Cervical polyp	5	1.1

Cervical erosions were observed in 52 patients, and were associated with *Trichomonas vaginalis* in 23 of them.

Four patients had herpes genitalis, nine condylomata acuminata, and five benign cervical polyps.

Discussion

According to King and Nicol (1969), symptoms are absent or insufficient to attract the patient's attention in up to 50 per cent. of cases of acute uncomplicated gonorrhoea in the female. It was found in this study that 32 per cent. of all the patients were asymptomatic.

Trichomonal vaginitis was reported in over 50 per cent. of cases of gonorrhoea by King and Nicol (1969), in 37 per cent. by Dunlop (1963), and in 45 of 95 women by Catterall (1970). In the present

study *T. vaginalis* was found in 29.8 per cent.; the percentage would probably have been higher if cultures had been made.

Garnier and Vieu (1955) reported candidiasis in 18 per cent. of women suffering from gonorrhoea. In the present series *Candida* was present in smears in 6.1 per cent.

Summary

459 cases of uncomplicated gonorrhoea in the female were studied, and the diagnosis was confirmed by culture in all cases.

The highest incidence was found in the age group 20 to 24 years (188 out of 459).

18.3 per cent. came at the request of male consorts who were already receiving treatment.

One-third were asymptomatic and one-third had purulent urethral discharge. Two-thirds of those with symptoms came to the clinic within a week of the onset.

In all cases the cervical secretion was abnormal and in nearly one-third of cases *T. vaginalis* was found as well as *N. gonorrhoeae*.

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Aspects cliniques de la gonococcie féminine non compliquée

SOMMAIRE

On a étudié 459 cas de gonococcie féminine non compliquée dont le diagnostic avait été confirmé par culture dans tous les cas.

C'est dans le groupe âgé de 20 à 24 ans que fut trouvé la plus haute incidence (188 sur 459).

18,3 pour cent des cas vinrent à l'instigation de partenaires masculins qui avaient été déjà traités.

Un tiers n'avait aucun symptôme, et un tiers présentait une suppuration urétrale. Ceux qui avaient des symptômes se présentèrent à la clinique en moins d'une semaine après le début.

Dans tous les cas, la sécrétion cervicale fut anormale et, dans presque un tiers des cas, *T. vaginalis* fut constaté en même temps que *N. gonorrhoeae*.